2012

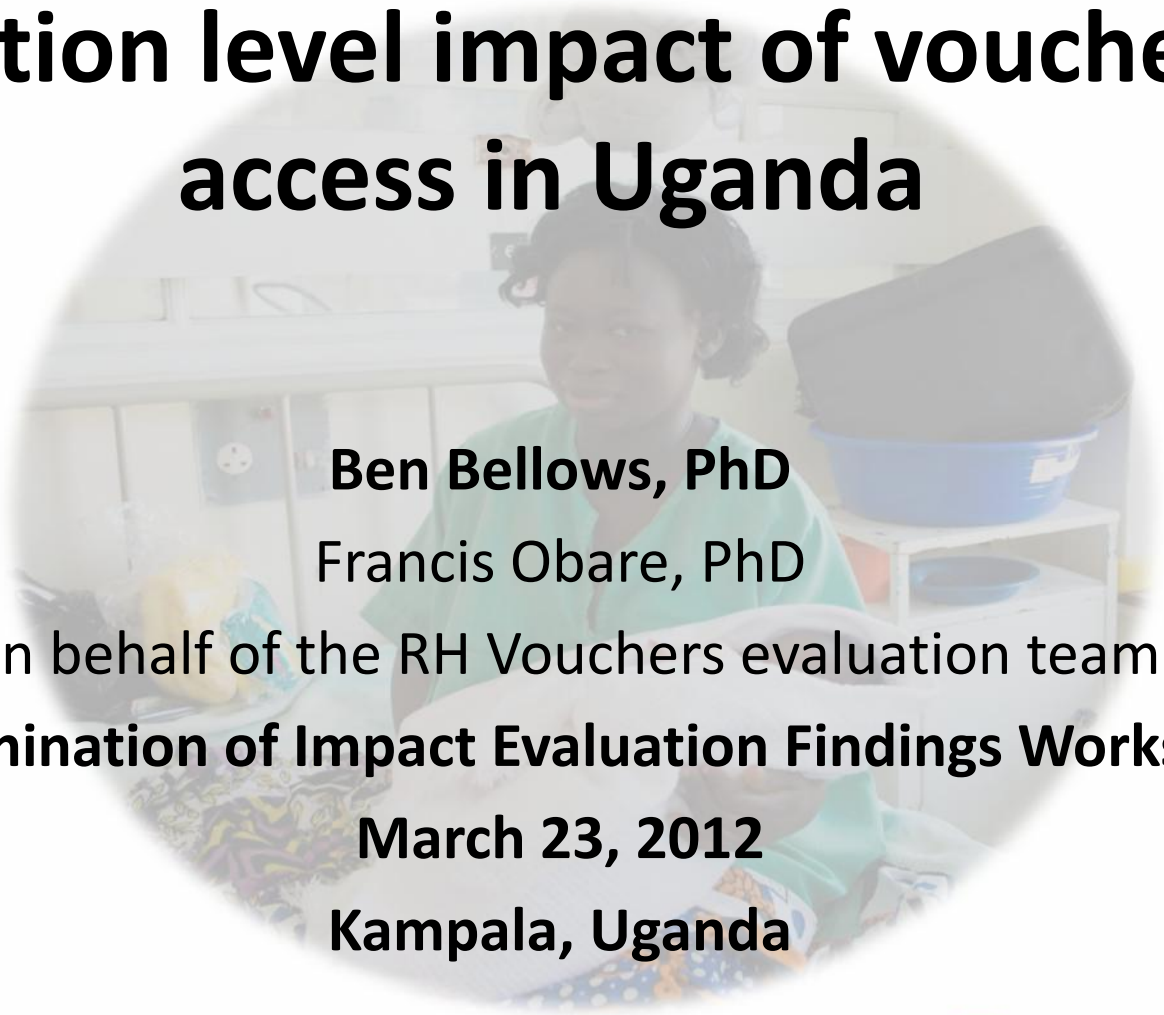
Population level impact of vouchers on access in Uganda

Benjamin Bellows
Population Council

Francis Obare
Population Council

Reproductive Health Vouchers Evaluation Team

Population level impact of vouchers on access in Uganda



Ben Bellows, PhD

Francis Obare, PhD

On behalf of the RH Vouchers evaluation team

Dissemination of Impact Evaluation Findings Workshop

March 23, 2012

Kampala, Uganda

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Background

- Use of vouchers are part of interventions aimed at influencing demand for health services
  - conditional cash transfers, social health insurance
  - approaches referred to as output-based aid (OBA)
- Combined with output-based approach and contracting with providers, its ultimate aims are to:
  - stimulate demand by increasing purchasing power for service utilization among the poor
  - Trigger competition leading to improved service quality
  - Increase access to services for individuals who would not have used the service in the absence of the subsidy

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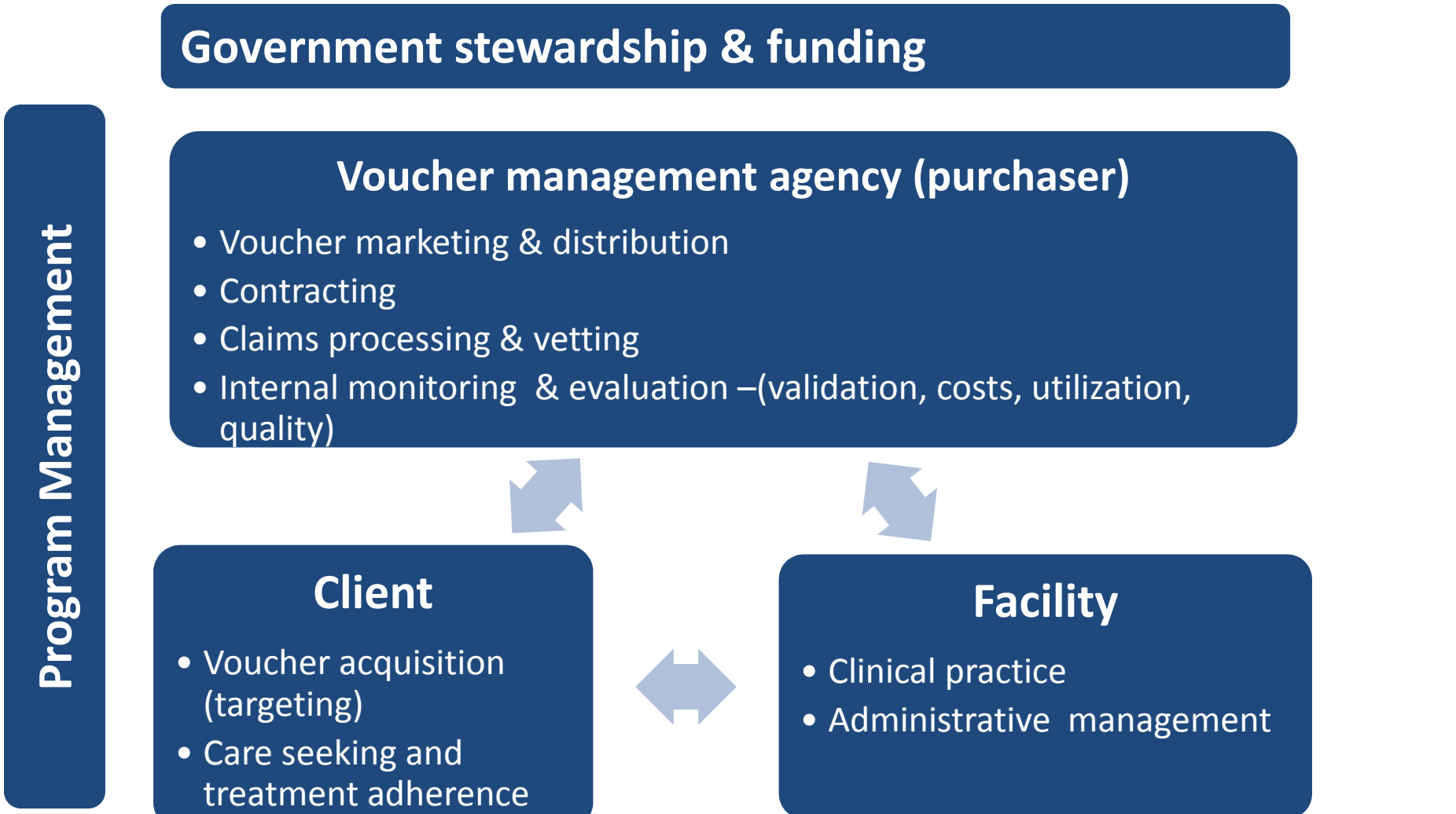
Voucher Program Design & Functions



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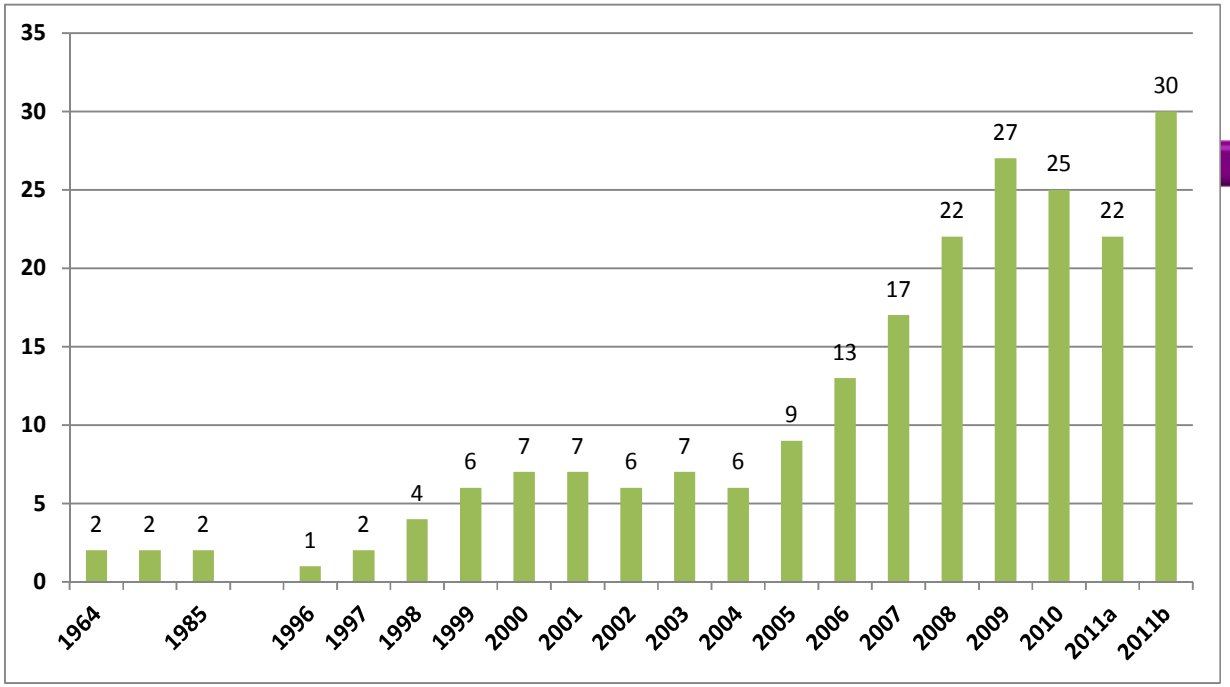
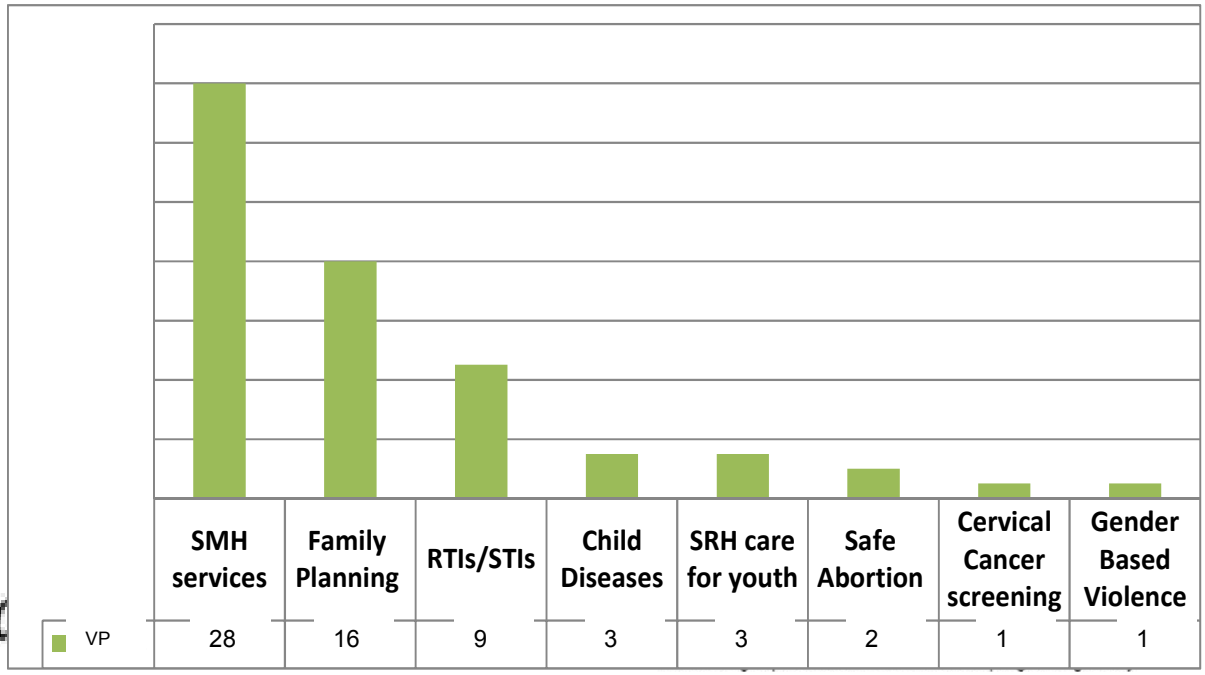


Number of active voucher programs year on year since 1964

Type of services provided in 40 voucher programs



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Two voucher systematic reviews

- Robust evidence that vouchers increase utilization **(13 studies)**
- Weak evidence that vouchers can affect health status **(6 studies)**; however, small changes in the evidence could change conclusion
- Modest evidence that vouchers effectively target specific populations for health goods/services **(4 studies)**
- Modest evidence that vouchers improve the quality **(3 studies)**
- Insufficient evidence to determine efficiency of vouchers **(1 study)**

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Overview of Uganda RH vouchers program

- Implemented on behalf of MOH by Marie Stopes Uganda since 2006.
- Phase I: 2006-2008 (KfW STI evaluation)
  - Mbarara, Ibanda, Isingiro, Kiruhura
  - 17 private facilities saw STI clients
- Phase II: 2008-2011 (GPOBA impact evaluation)
  - 85+ private facilities across western 20+ districts
  - Safe motherhood package (ANC, delivery, PNC) , STI treatment
  - GPOBA paid 98% of voucher service delivery cost
- Phase III: 2012-2015
  - Family planning services & safe delivery
  - FP: 900 facilities to receive outreach teams; 500 private facilities to be contracted in a voucher franchise

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Voucher Distribution and Eligibility

- Vouchers distributed by Marie Stopes as the Voucher Management Agency (VMA)
- Poverty grading tool used to identify clients (FP & SMH)
  - items on household assets, amenities, expenditure, income, health services
- Safe motherhood includes
  - ANC up to 4 visits
  - delivery and complications
  - PNC up to 6 weeks

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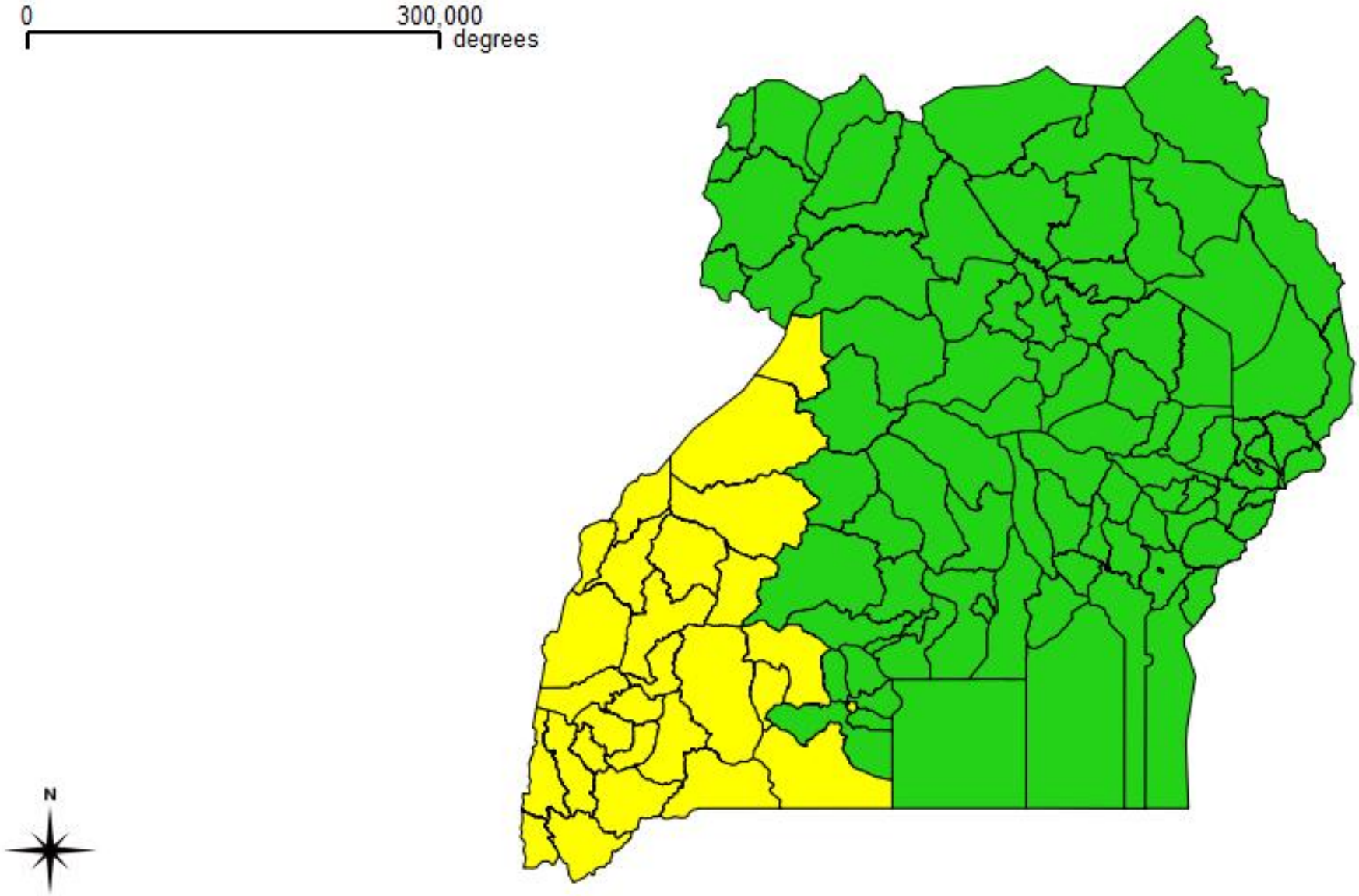
SMH impact evaluation objectives

1. To assess the effect of the program on improving access to, quality of, and reducing inequities in the use of reproductive health services; and
2. To evaluate the impact of the program on improving reproductive health behaviors and outcomes at the population level.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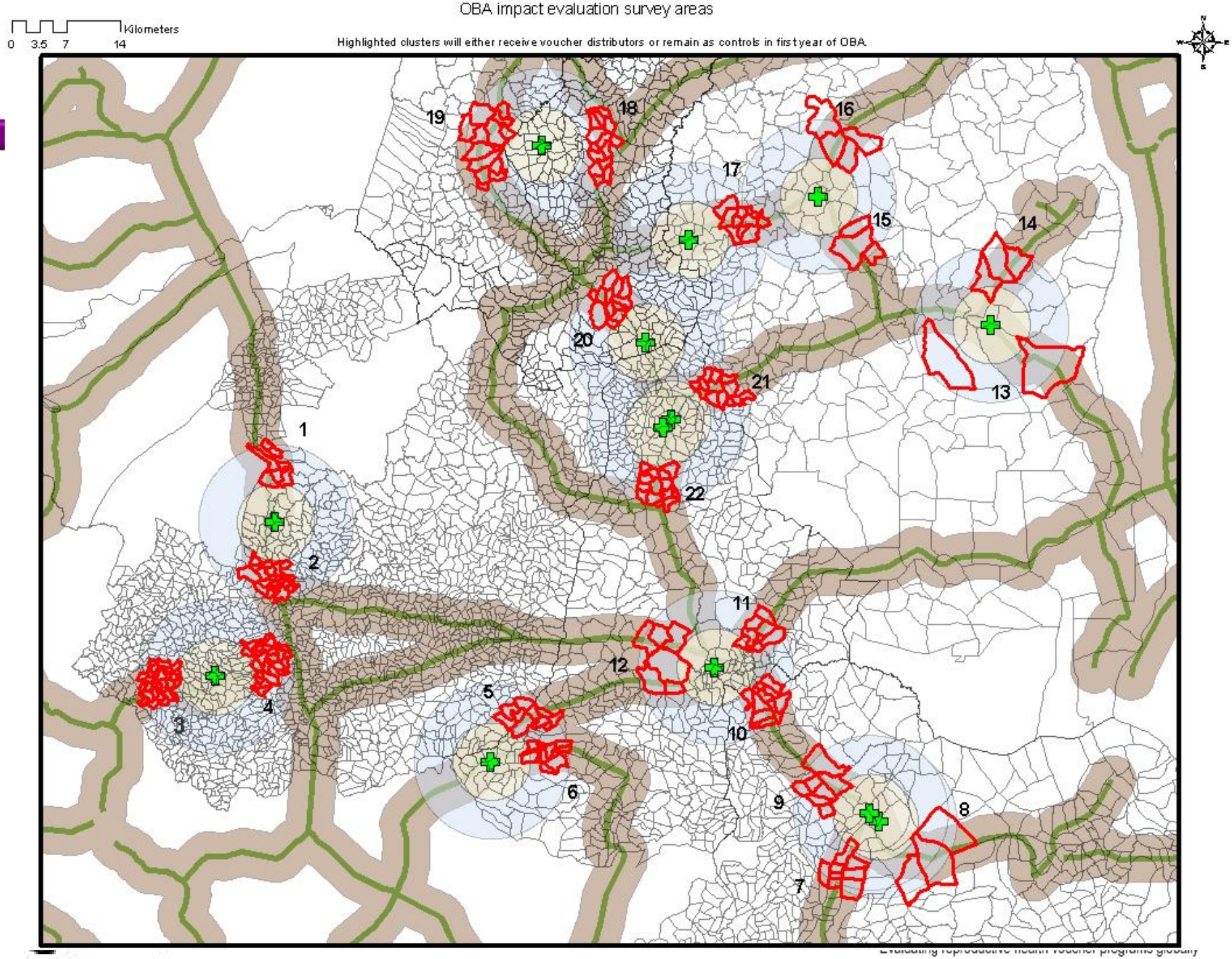
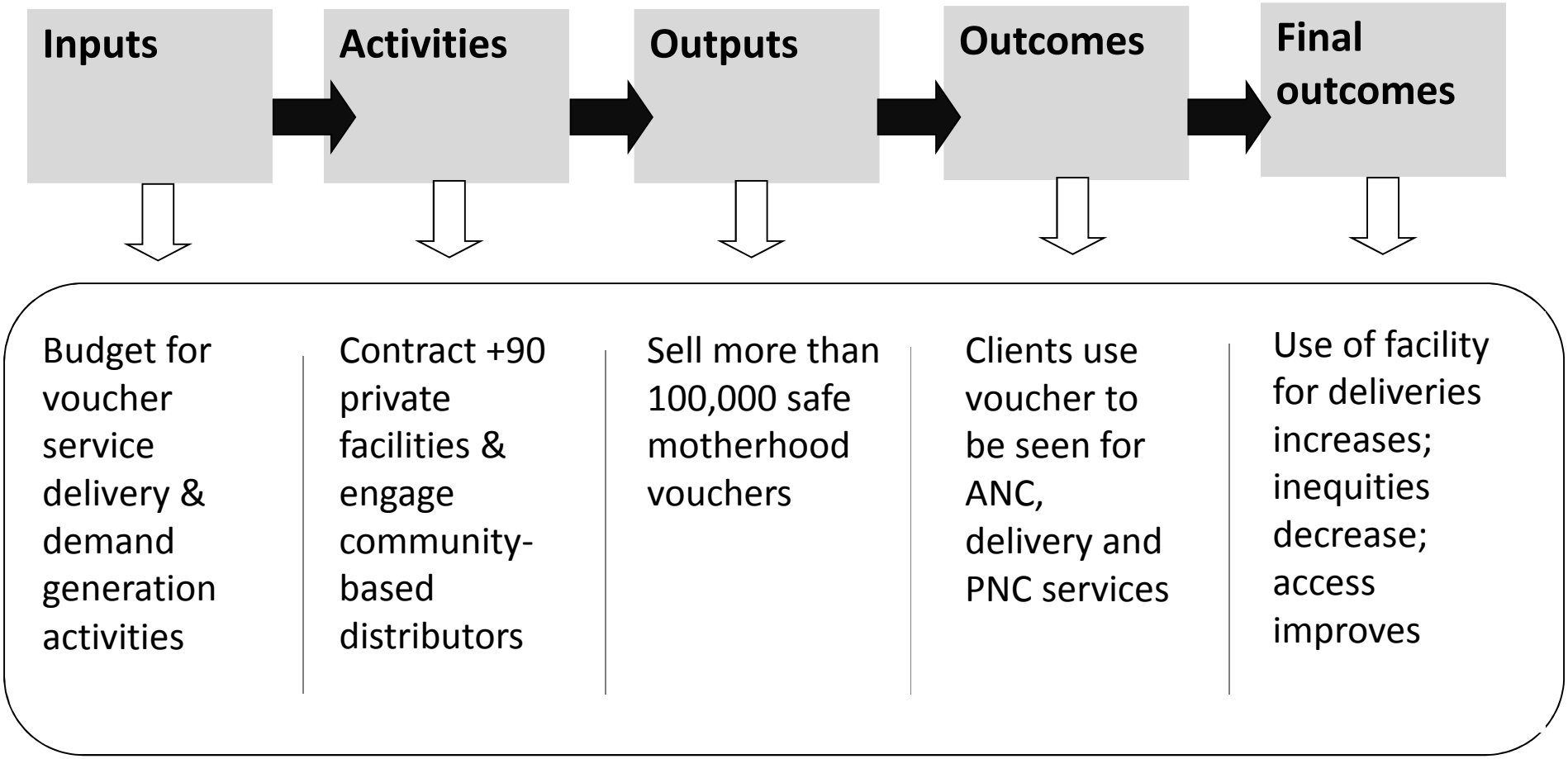

OBA impact evaluation survey areas
Kilometers
0 3.5 7 14
Highlighted clusters will either receive voucher distributors or remain as controls in first year of OBA
19
18
16
17
15
14
20
21
13
1
22
2
11
12
5
10
4
3
6
9
8
7

Results chain for SMH voucher



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Impact evaluation design

		2008	OBA voucher program	*2010/11*
SMH Vouchers	Voucher exposed villages	X	→	X
	Control villages	O	→	O

Household surveys:

- Baseline (2008): 2,266 women and 177 men in 97 villages
- Endline (2010): 2,313 women and 582 men in 133 villages

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Analysis

- *Post hoc* treatment assignment
  - Analysis 1
    - Treatment: voucher clients
    - Controls: non-voucher clients
  - Analysis 2
    - Treatment: Villages with voucher clients
    - Controls: Villages no voucher clients

- Difference-in-difference multivariate modeling for tests of association

Results 1: Use of voucher by poor*

Percentage of women who participated in the 2010-2011 survey that had ever used the *HealthyBaby* voucher by household wealth index		
Household wealth index	Percent	Number of women
Poorest quintile	29.3	482
Poorer quintile	26.9	442
Middle quintile	16.5	449
Richer quintile	19.4	465
Richest quintile	16.2	475
Total	21.7	2,313

Results 1: Use of any facility for delivery

	Voucher clients (%)		Non-voucher clients (%)			
	Before program	After program	Before program	After program	Percentage points[a]	Odds ratios[b]
Place of delivery	(N=175)	(N=434)	(N=708)	(N=1184)		
Home	30%	17%	38%	31%	6	0.6* [0.3-0.9]
Any facility	70%	82%	61%	69%	4	1.6 [0.9-2.8]

Notes: **[a]Based on differences in changes in proportions using health services: negative sign means the change was greater in the comparison group; [b]Based on multilevel logit models with interaction terms--95% confidence intervals in square brackets ; *p<0.05; **p<0.01.**

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Results 2: Use of private facilities for delivery

	Voucher clients (%)		Non-voucher clients (%)			
	Before program	After program	Before program	After program	Percentage points[a]	Odds ratios[b]
Place of delivery	(N=175)	(N=434)	(N=708)	(N=1184)		
Private facility	26%	52%	18%	28%	16	2.2** [1.3-3.8]
Public facility	44%	30%	43%	41%	12	0.5* [0.3-0.9]

Notes: **[a]Based on differences in changes in proportions using health services: negative sign means the change was greater in the comparison group; [b]Based on multilevel logit models with interaction terms--95% confidence intervals in square brackets ; *p<0.05; **p<0.01.**

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Result 3: use of ANC & PNC

	Voucher clients (%)		Non-voucher clients (%)			
	Before program	After program	Before program	After program	Percentage points[a]	Odds ratios[b]
Place of delivery	(N=175)	(N=434)	(N=708)	(N=1184)		
Four or more antenatal care visits	55% (N=183)	70% (N=459)	49% (N=779)	56% (N=1281)	8	1.4 [0.9-2.2]
Postnatal care services	60% (N=183)	67% (N=459)	45% (N=779)	53% (N=1281)	-1	1.1 [0.7-1.8]

Notes: **[a]Based on differences in changes in proportions using health services: negative sign means the change was greater in the comparison group; [b]Based on multilevel logit models with interaction terms--95% confidence intervals in square brackets ; *p<0.05; **p<0.01.**

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Result 3: Paid for most recent birth

	Voucher client present in village by 2010		No voucher clients present in village by 2010			
	Before program	After program	Before program	After program	Percentage points[a]	Odds ratios[b]
Paid for last delivery						
Private facility	98% (N=206)	54% (N=133)	97% (N=112)	86% (N=21)	33	0.1* [0.0-0.9]
Public/private facility	56% (N=533)	39% (N=282)	52% (N=292)	32% (N=81)	-3	0.9 [0.4-2.1]

Notes: **[a]Based on differences in changes in proportions using health services: negative sign means the change was greater in the comparison group; [b]Based on multilevel logit models with interaction terms--95% confidence intervals in square brackets ; *p<0.05; **p<0.01.**

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Conclusions

- Based on household wealth index, a significantly higher proportion of women from the two poorest quintiles had used the vouchers compared to those from middle, richer and richest quintiles.
- The program significantly contributed to increased deliveries in private facilities which were accompanied by significant reductions in public facility as well as in home-based births.
- The program further significantly contributed to reductions in the likelihood of paying out-of-pocket for deliveries in private health facilities among communities exposed to it.

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